

POLAND/Diseases of Farm Animals - Diseases Caused by Bacteria and R-2
Fungi.

Abs Jour : Ref Zhur - Biol., No 14, 1958, 64613

Author : Strumillo, Zofia

Inst : -

Title : Beta-Hemolytic Streptococci in the Semen of Stallions in
the Light of Periodic Bacteriological Examinations.

Orig Pub : Med. weteryn., 1957, 13, No 5, 257-261

Abstract : The analyses of the semen of 400 stallions, carried out
during a period of three years, showed that beta-hemolytic
streptococci are rarely encountered in the semen and that
their presence has an incidental and transient character.

Card 1/1

- 1 -

OLCZAK, Maria; STRUMILO, Barbara

Phage therapy of staphylococcal infections of the skin. Polski
tygod. lek. 16 no.7:250-252 13 F '61.

1. Z I Kliniki Chorób Zakaznych w Warszawie; kierownik: doc. dr
med. K. Rachon i z Pracowni Fagowej Stacji Sanitarnej-Epidemiologicznej
w Warszawie; kierownik: doc. I. Lipska.

(STAPHYLOCOCCAL INFECTIONS ther)

(DERMATOLOGY ther)

(BACTERIOPHAGE)

STRUMINGER, A.

TECHNOLOGY

Periodicals: FRIEDTJA LEINWOLDT. Vol. 7, no. 10, Oct. 1958

SIRKOWSKI, A. Determination of the slanting angles of the frame-saw blades.
p. 364

Monthly List of East European Accessions (FEAT) LC, Vol. 8, No. 2,
February 1959, Unclass.

STRUMINSKA, Felitsiya

I was in Stalingrad. Rabotnitsa 36 no.10:18-19 O '58.
(MIRA 12:1)
1. Glavnnyy redaktor zhurnala "Kobeta i zhytse [Kobieta i życie]."
(Stalingrad--Description)

"APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9

... segment MAC 10000000000000000000000000000000

Lectrarily classified, stud-link chain cables. The
operator database is now available to take

APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9"

STRUMINSKIY, B.V.; ZARUBINA, I.S. [translator]

Determination of the root-mean-square radius of transition $\text{He}^3 \rightarrow \text{H}^3$.
Dubna, Ob"edinennyj institut jadernykh issledovaniij, 1962. 4 p.
(No subject heading)

L 11015-65 EWT(m) DIAAP/AS(mp)-2/SSD/AFWL/ASD(a)-5/ESD(t)

ACCESSION NR: AP4046436

8/0056/64/047/003/1147/1149

AUTHOR: Struminskiy, B. V.

19 19

(B)

TITLE: Capture of thermal neutrons by deuterons

SOURCE: Zhurnal eksperimental'noy i teoreticheskoy fiziki, v. 47,
no. 3, 1964, 1147-1149

TOPIC TAGS: thermal neutron, deuteron, neutron capture, capture
cross section, wave function

ABSTRACT: The cross section of the reaction $n + d \rightarrow H^3 + \gamma$ is calculated using the wave functions introduced by L. I. Schiff (Phys. Rev. v. 133, 802B, 1964). By comparing the calculated cross section with the experimental data, the author then obtains the weight of the mixed-symmetry S-state which is present as an admixture in the nuclear wave function. The calculations were made for both Gaussian-function and Irving-function distributions. The experi-

Card 1/2

L 11015-65

ACCESSION NR: AP4046436

mental value of the cross section (0.57 mb at 2200 m/sec) corresponds to a weight of 3.06% or 2.34% for the Gaussian and Irving functions, respectively. The errors of the calculation are briefly discussed. Orig. art. has: 12 formulas.

ASSOCIATION: Matematicheskiy institut Akademii nauk SSSR (Mathematics Institute, Academy of Sciences, SSSR)

SUBMITTED: 17Apr64

ENCL: 00

SUB CODE: NP

NR REF SOV: 000

OTHER: 004

Card 2/2

STRUMINSKIY, B.V.

A model of the symmetry of strong interactions based on the Sp6
group. IAd. fiz. 1 no.4:701-709 Ap '65. (MIRA 18:5)

L 64752-65 ENT(m)/T/EWA(m)-2
ACCESSION NR: AP5016551

UR/0056/65/048/006/1594/1597

AUTHORS: Zaymidorova, O.A.; Struminskij, B.V.; Sulyayev, R.M.;
Falomkin, I.V.; Tsupko-Sitnikov, V.M.; Shcherbakov, Yu.A.

TITLE: Nuclear form factors in muon capture by He-3

SOURCE: Zhurnal eksperimental'noy i teoreticheskoy fiziki, v. 48,
no. 6, 1965, 1594-1597

TOPIC TAGS: muon, helium, capture cross section

ABSTRACT: The authors obtained improved values of the nuclear matrix element for the reaction $\mu^- + \text{He}^3 \rightarrow \text{H}^3 + \nu$ from the experimental form factors obtained from the capture of pions by He^3 and from the scattering of electrons by He^3 and H^3 . The calculations are based on the expression given by Fujii and Primakoff for the matrix elements (Nuovo Cimento v. 12, 327, 1959). The partial probability for

Card 1/3

L 64752-65

ACCESSION NR: AP5016551

12

the capture of muons by He^3 , calculated on the basis of the universal weak interaction theory with the values of the form factors obtained, is found to be $1515 \pm 55 \text{ sec}^{-1}$. This agrees well with the value $1490 \pm 40 \text{ sec}^{-1}$ obtained in earlier experiments by the authors (ZhETF v. 44, 389, 1963). The ratios of the pseudoscalar constants are calculated to be $g_A^\beta/g_V^\beta = -1.160$ and $g_p^\mu/g_A^\mu = 7$. From a comparison of the calculated probability with the experimental results the authors estimate the pseudoscalar constant to be $g_p^\mu = (8 \pm 3)g_A^\mu$. "The authors thank S. M. Bilen'kiy, S. S. Gershteyn, and B. Pontecorvo for a discussion of the results." Orig. art. has: 1 figure and 3 formulas.

ASSOCIATION: Ob'yedinnyy institut yadernykh issledovaniy (Joint Institute of Nuclear Research)

Card 2/3

"APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9

L 64752-65

ACCESSION NR: AP5016551

SUBMITTED: 22Jan65

ENCL: 00

SUB CODE: NP

NR REF SOV: 003

OTHER: 011

Card 3/3

APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9"

STRUMINSKIY, G. V.

11-5895. Mutual solubility of polymers. III. Heats of mixing of polymers. IV. Influence of packing density of molecules upon their mutual solubility. G. V. STRUMINSKIY and G. I. SLONIMSKIY. *Zh. Fiz. Khim.*, 1956, No. 9, 1941-7; No. 10, 2144-8. *Referat. Zh. Khim.*, 1957, abs. 34616. Cf. *Rubber Abs.*, 1957, abs. 2556. III. From data on heats of solution of polymers, their mixtures, and on heats of mixing of their solutions, heats of mixing of polymers are determined using Hess's Law. The mixtures included various rubbers. The data show that most polymers mix endothermically while mixtures of their equal-concentration solutions separate into two phases, but exothermic mixing and the absence of separation is observed with mixtures of natural rubber¹ and sodium butadiene rubber². Polymers which are similar in structure are not mutually soluble. It is concluded that mutual solubility of polymers is determined by the sign of their heat of mixing.

IV. It has been shown that the mixing of SKB with SKS-30 rubber³ and with polystyrene proceeds with the liberation of heat, while mixtures of their equal-concentration solutions separate out into two phases. This separation indicates a negative heat of mixing. The authors explain the observed positive heat effect by the reduction of the volume of the system on mixing of their components.

6
402c(j)
2 May

1/2

STRUMINSKIY, G.V.

✓ The mutual solubility of polymers. III. The heat of mixing of polymers. G. V. Struminskii and O. L. Skaninskii. *Zhur. fiz. (L. Ya. Karpov Phys.-Chem. Inst., Moscow)*, 27, No. 1, p. 10, 1941-7 (1950); cf. preceding abstr. The relation between the mutual solv. of polymers and the sign. of the heat effect during mixing was investigated by the data of the heat of soln. and of mixing of cellulose esters, β -butadiene, butadiene-styrene, natural rubber, polyacrylates, polymethacrylates, polystyrene, and other polymers in an adiabatic calorimeter, with benzene, cyclohexanone, CHCl_3 , and acetone as common solvents. Before testing, most polymers were purified by pptn. with nonsolvents, but synthetic rubber samples were used as received, because their purification resulted in solv. losses due to strong oxidation resulting from the antioxidant removal during the purification. The method used in blending the polymer mixts. affected the results, and the methods were standardized on the viscosity detsn. of dil. solns. of the polymers in 5-6 different concns., not exceeding 1%, and extrapolating the characteristic viscosities to 0 polymer concn. The heats of

Matt. 10
454
455
2 May
1/2

STRUMINSKII G.V. & ETC.

mixing, reproduced in a table, varied between +6.0 and -8.0. Most of the polymers mix endothermally, and their solns. separate into layers; their apparent miscibility is caused by their high viscosity. Natural rubber mixes exothermally with Na butadiene, nitrocellulose (11.9% N), acetylcellulose (68% Ac-group), and poly(vinyl acetate), and the mixts. do not separate. IV. The effects of molecular packing tendency upon the mutual solubilities. G. I. Slonimskii and G. V. Struminskii. *Ibid.* 2144-8.—The anomalous results of mixing of Na butadiene rubber with butadiene styrene, a single-phase formation upon the mixing of solns. of the same concn., when the heat of mixing is pos., and a layer formation with a neg. heat of mixing effect, is explained by the significant influence of the vol. reduction during the mixing of these polymers. When no contraction occurs during the mixing, the heat effects do not depend upon the degree of polymerization, and the sign of the heat effect can even be reversed if the mol. density of the structure becomes reduced during the polymerization. The existence of lower crit. mixing temps. above the polystyrene setting temp. for butadiene rubber with butadiene styrene and with polystyrene is concluded from the exptl. results and the data in the literature. The lower crit. mixing temp. is caused by the lowering of the mol. packing density at temps. below the polystyrene setting temp.

W. M. Steinberg

AM work

SLONIMSKIY, G.L.; STRUMINSKIY, G.V.

Mutual solubility of polymers. Part 4. The effect of density of packing of polymer molecules on their mutual solubility. Zhur. fiz. khim. 30 no.10:2144-2148 O '56. (MLRA 10:4)

1. Fiziko-khimicheskiy institut im. L.Ya. Karpova, Moskva.
(Polymers) (Solubility)

SC7/64-50-4-25-27
 S(1)
 AUTHOR: Poratitsky, I. I.
 TITLE: Conference of the Workers of the Plastic Industry
 (Svezhchandye rebotnikov proizvodstvennosti plastmass)
 PERIODICAL: Khimicheskaya promyshlennost', 1953, Nr. 4, pp. 68-69 (CASE)
 ABSTRACT: From June 9 to 11, the branch conference of the workers in the plastic industry was held in Moscow. It was organized by the following organizations: the Central Committee of the Soviet All-Union Trade Union of the USSR (Committee of Ministers of the USSR for Chemistry), TIK (Torgosug Rabochikh Sovetov i Kolkhozov Proizvodstvennosti (Central Committee of the Trade Union of the Workers of the Petroleum and Chemical Industry), Tsentralnoye pravleniye TIKO (Min. P. I. Mordovtseva (Central Administration TIKO) and Sovet na rukhach zhivotnykh materialov Moskovskogo oblastnogo i Gorskogo ekonomicheskikh rayonov, GPKh SSSR i RAZN (Council of the National Economy of the Moscow Oblast), and Tom Economic District), TIK, USSR and RSPN. 1000 persons took part in the Conference. The tasks which were set at the Plastics Industry by the III Congress of the CPSS and the May Planum of the TIK CPSR 1950 were discussed. Beside the Plenary Session, sessions of four different sections

took place. In the session of the section for polymerization of plastic and celluloseester 16 lectures were delivered. Among them the following: P. A. Glavniuk (Kukorskii khimicheskii zavod) - "Kuko Chemical Works" - research Work With Polyformaldehyde, A. V. Golubya (NIPPP) - Styrene Co-polymer, I. J. Shabot, (Voronezhsky zavod) - Propylene, S. M. Kirov (Servian Works) - "Synthetic Catalysts. In the section of vinyl Chloride with Mercury-trio Catalysts. In the section of combination plastics Pid. V. Ivanov (Minsk-Chelyabinsk) gave a report "Synthetic Rubber for Reactions According to the Technology of the Pidol Formulabidae the Section Glass Plastic 12 lectures and 9 communication of research and studies concerning the results obtained at the production of glass plastic were delivered. The following lectures were held in the section for final Processing of plastics: E. S. Grishinov (Moskva-koksostruktura) "Synthetic Latexes and their Application"; L. N. Sverdlov (Moscow) "Workshop of the Final Products According to the Technology of the Two-plastic to Pid. P. M. Miskovich (Krasnaya ekonomicheskaya republikyev Economic Rayon); "On Manufacturing Complicated Plastic Products of

polyacrylates by Casting at Low Pressure Directly from the Fusion (SHP) "On the Use of Casting Implements", G. M. Mikhalev - "Soft and Hard Polyvinyl Chloride". Mirzoev. The congress delects criticized the work of the Ogranichivayushchiye Plastmassy zavod. Minister SSSR Po Khlash i sotsializatsionno-kommuna Soveta Syntheticheskogo sovarkhazha (Administration for Plastic Masses and Minister of the State Committee of the Council of Ministers of the USSR for Chemistry), and some institutes because of insufficient coordination. Furthermore the industry, the supply with projecting plant of the plastic industry by some districts was criticised. No unsatisfactory development of some districts of National Economy (Kerchenskiy, Amur, etc.) was pointed out. The conference supported the decision of the branch conference of the nitrogen industry concerning the introduction of a holiday to be called "Day of Chemists".

Card 1/3

85146

S/91/60/000/007/009/015
B004/B056

Effect of Technical Characteristic
Values in Extrusion Upon the Efficiency
of Screw Extruders and the Quality of
Polyvinyl Dichloride

(Fig. 3). Later pressure was measured by means of a continuous measuring device (Fig. 4) which contained a bellows-type thermostat such as is used for the temperature control in the "Moskvich" motor car. Efficiency was measured on the basis of weight and length of the tube extruded per minute. The authors show their experimental data in the form of diagrams. Fig. 5: weight of the extruded tube as a function of temperature. Fig. 6: length of the extrusion were observed. The first maximum of the extrusion was constant at 120°C. Fig. 7: pressure at the end of the screw barrel as a function of temperature. Up to 120°C pressure dropped with rising temperature and wall thickness; above 120°C, the pressure increased with increasing temperature. The pressure at the head did not exceed 10 kg/cm². Fig. 8: Extrusion as a function of pressure. A dependence of extrusion on pressure exists only up to 120°C. Fig. 9: Temperature ranges in which qualitatively good tubes are obtained. The upper limit was about 120°C.

Carri 1/3

BR

ACCESSION NR: AT4016996

S/3057/63/000/000/0080/0092

AUTHOR: Struminskij, G. V.; Ignatova, T. A.; Katkova, T. N.; Zelenov, A. S.; Ivanova, T. G.

TITLE: Glue PED-B for gluing formula 57-40 masticated rubber to the surfaces of building structures

SOURCE: Zashchitnye pokrytiya v atomnoy tekhnike (Shielding in nuclear engineering); sbornik statej. Moscow, Gosatomizdat, 1963, 80-92

TOPIC TAGS: glue PED-B, 57-40 masticated rubber, masticated rubber, radioactive contamination, radioactive shielding, nuclear shielding, glue

ABSTRACT: The authors discuss the shortcomings of certain of the glues thus far used for fastening the polyvinylchloride masticated rubber shielding (formula 57-40) which is presently in wide use as a protection against radioactive contamination. Experimental work has shown that glue compositions on a perchlorvinyl resin base with a small admixture of epoxide resin ED-5 have good adhesion to formula 57-40 polyvinylchloride masticated rubbers. The introduction into the composition of epoxide resin hardeners leads to the formation of a three-dimensional structure during the hardening process of

Card 1/3

ACCESSION NR: AT6016996

the glue, resulting in a considerable increase in the strength of the bond in comparison with perchlorvinyl glues. The authors enumerate the most important general requirements of a glue for these purposes: necessary strength and service life of the glue bond, viability of the glue and non-inflammability during the working process, and others. The special requirements were the following: 1) The glue must not impair the desorption properties of the shielding with respect to radioactive contamination; 2) The surface of glued lap bonds of glued materials must not accumulate radioactive contaminants and must be capable of being washed free of them no worse than the covering material; 3) The glued bond must possess sufficient resistance to radiation. An experimental evaluation was made of certain general and special properties of type PED-B glue. Among the parameters considered were the mechanical properties (with description of the test equipment employed) and the sorption-desorption properties of the glue with respect to radioactive isotopes, as well as its ability to withstand radiation. A description of the technological process to be followed in fastening formula 57-40 masticated rubber shielding with PED-B glue is also given. It was found that this glue, which is manufactured on an incombustible methylene chloride solvent has good adhesion characteristics not only to the masticated rubber, but also to cement, metals, wood and other construction materials. It is not dangerous from the

Card 2/3

ACCESSION NR: AT4016996

point of view of explosions. While the residual radioactivity accumulated by glued bonds was found to be very high (up to 60%), it was found that by lacquering the bonds with high-deactivating lacquers (VKHL-4000, KHSL) this residual activity could be reduced to a level close to the value of this parameter for the basic shielding material. The authors also determined that the bonds preserve the required strength under the effect of a dose of gamma-radiation to 100 Mrads. Orig. art. has: 3 tables and 6 figures.

ASSOCIATION: none

SUBMITTED: 00

DATE ACQ: 20Feb64

ENCL: 00

SUB CODE: NP, MT

NO REF Sov: 002

OTHER: 000

Card 3/3

ACCESSION NR: AP4028154

S/0291/64/000/001/0071/0074

AUTHORS: Turapov, A.; Struminskiy, G. V.

TITLE: Heat of copolymerization of polydiethyleneglycolmaleinateadipinate with styrene

SOURCE: Uzbekskiy khimicheskiy zhurnal, no. 1, 1964, 71-74

TOPIC TAGS: heat of copolymerization, polyester, polyester polymer, polyester copolymer, polyester styrene copolymer, heat of curing, heat of hardening, resin reactivity

ABSTRACT: The heat of curing polyester resins based on polydiethyleneglycolmaleinateadipinate (PDMA) with different amounts of styrene was determined calorimetrically. It was determined that PDMA will polymerize without the addition of styrene (heat of polymerization = 23.3 cal/gm). The heat of copolymerization increases as styrene is increased from 0-33%, then levels off with 33-40% styrene and again increases (to 76 cal/gm) as styrene is increased from 40-70%. The amount of styrene in the copolymer changes the time required to harden the copolymer; the minimum time of 61 minutes is realized with 33% styrene. Changes in heat evolution and curing time of the
Card 1/2

ACCESSION NR: AP4028154

PDMA resin are indicative of the change of reactivity of polyester resins depending on styrene content. The heat of polymerization of PDMA without styrene was determined at 60, 80 and 100C. Although the heat of polymerization values attain a constant value at temperatures of 80-100C, examination of the resins polymerized at 80 and 100C showed that they still contain 10-15% unreacted groups. "(Resin) samples were supplied by P. Z. Pi and coworkers." "Authors thank L. G. L Slonimsk for a valuable advice." Orig. art. has: 3 figures.

ASSOCIATION: NIITsF Gosplana SSSR (NIITsF, Gosplan, SSSR)

SUBMITTED: 26Sep63

DATE AQQ: 29Apr64

ENCL: 00

SUB CODE: SS, GC

NR REF SOV: 006

OTHER: 004

Card

2/2

STRENGTHEN

Determination of adsorption isotherms of carbon disulfide
on activated carbon of the "Norit" type. J. Chrzest-
zowski, L. Stachurska and M. Wronski (Univ. Lódz, Fac.
Techn. Eng.) Roczn. Nauk. Lódz. 1962, Vol. 12, No. 2.

The adsorption of carbon disulfide on activated carbon of the "Norit" type was studied at low pressures. The adsorption begins very lightly. At higher pressures, the adsorption increases rapidly to level off at much higher pressures. A table of differential heats of adsorption of CS₂ according to isotherms at 10° and 16° is given.

B. Krawiec

[Signature]

SEML'YUCHI^Y, V.V.

Skol'khenie kryla v viazkoj zhidkosti. (Akademija Nauk SSSR. Dokl dy. Novaia serija, 1956, v. 54, no.7, p.575-578)

Title tr.: Sideslip in a viscous fluid.

Also published in French in Comptes rendus de l'Academie des Sciences de l'URSS. Nouvelle serie, 1956, v.54, no.7, p.571-574 (Q60.A52)

AS262.S36v3 v. 54

SS: Aeronautical Sciences and Aviation in the Soviet Union, Library of Congress, 1955

STRUMINSKIY, V.V.

Struminsky, V. V. Glissement d'une aile dans un gaz visqueux compressible. C. R. (Doklady) Acad. Sci. URSS (N.S.) 54, 765-768 (1946).

The Navier-Stokes equations and the equation of energy are written for the flow of a compressible viscous fluid about a yawed infinite cylinder, i.e., flow in which all physical quantities are independent of the coordinate z measured along the cylindrical axis. In certain cases (isothermal, adiabatic) the flow pattern in planes normal to the axis is independent of the axial flow; hence flow patterns can be carried over from plane cases. In such cases the forces on the cylinder will depend upon the Mach and of Reynolds numbers based on the normal (to the axis) component of the stream velocity and on the angle of yaw in a simple way.

For large Reynolds numbers, the general equations are approximated in the manner of Prandtl's boundary-layer theory and it is further assumed that the Prandtl number is unity and there is no heat transfer from the cylinder. The subsequent treatment follows closely that of Dorodnitzyn [see: C. R. (N.S.) 34, 213-219 (1942); these Rev. 4, 176].

Again the energy equation can be integrated and becomes a statement of constant enthalpy. The same independent variables are introduced and in this case a pair of simultaneous nonlinear partial differential equations results. The author proposes to obtain approximate solutions by the same method as Dorodnitzyn, using the Kármán-Pohlhausen method, assuming quartic expressions for both the axial and normal velocity components.

In the special case of the yawed flat plate, the problem can be related to the corresponding plane-flow problem, which was treated in detail by Dorodnitzyn [loc. cit.]. After correction of an apparent typographical error in equations (13), the results appear to state that the boundary-layer flow is in the free-stream direction and proportional to $\psi''(r)$ [see these Rev. 4, 176], where, in this case, r is defined proportional to the normal component of the stream velocity.

For other cylinders, the boundary-layer flow will deviate from the stream direction, assuming an axial direction at the point of separation of the normal flow.

W. R. Stars (Ithaca, N. Y.).

Source: Mathematical Reviews.

Vol.

No. 176.

STRUMINSKIY, V.V.

PROCESSES AND PROPERTIES INDEX

AER

Aerodynamics (2)

Sideslip in a Viscous Compressible Gas. V. V. Struminskii.
(Akademiia Nauk S.S.R., Leningrad, Doklady, Vol. 54, No. 9, 1946,
pp. 769-722.) U.S., N.A.C.A., Technical Memorandum No. 1276, April,
1951. 8pp. 2 references. Development of a theory of the three-
dimensional boundary layer in a compressible gas by which the aero-
dynamic coefficients of a sideslipping wing can be determined.

July '51

AMERICAN METALLURGICAL LITERATURE CLASSIFICATION

~~SECRET~~
STRUTINSKI, V. V.

Sideslip in a viscous compressible gas. Washington, 1951. 8 p. (U. S. NACA TM no. 1276)

Trans. of Skol'zhenie kryla v viazkom szhimaemom gaze.

TL507.U57 no. 1276

SC: Aeronautical Sciences and Aviation in the Soviet Union, Library of Congress, 1952.

STRUMINSKIY, V.V.

1-FW

✓ Streminskii, V. V. Three-dimensional boundary layer on
an arbitrary surface. Dokl. Akad. Nauk SSSR (N.S.)
108 (1956), 595-598. (Russian)

play
Die Gleichungen für die dreidimensionale Grenzschicht
werden für $Re \rightarrow \infty$ (Re Reynoldssche Zahl) aus den
Navier-Stokeschen Gleichungen hergeleitet. Hierbei wird
angenommen, daß die Kontur des umströmten Körpers
stetig differenzierbare Hauptkrümmungen hat und die
Geschwindigkeit in der Nachbarschaft beim Grenzüber-
gang nebst den Ableitungen erster und zweiter Ordnung
endlich bleibt. Es werden Spezialfälle hervorgehoben,
in denen Analogie zu den Gleichungen der dreidimensio-
nalen Grenzschicht für die ebene Platte besteht.

K. Maruhn (Dresden).

STRUMINSKY, V. V.,

"Methods of Calculating the circulation around a sweptback wing in subsonic flow,"
with LEBED', N. K.,

Theory of the Three-dimensional Boundary Layer on a Slipping Wing, Collection of
Theoretical Papers in Aerodynamics, Moscow, Oboronogiz, 1957.

This collection assembles a number of scientific reports, on theoretical aerodynamics,
first printed in various publications between 1947 and 1952, and intended for research
workers in advanced aerodynamics.

(Abstract on cards following)

Collection of Theoretical Papers (Cont.) 823

computing machines. The report contains 8 figures and 3 tables. There are 9 references, of which 5 are Soviet and 1 German.

Struminskiy, V.V. Theory of the Three-dimensional Boundary Layer on a Slipping Wing 174

The report, first published in 1949, investigates the problem of slipping of a wing of infinite span in the uniform flow of an incompressible fluid and in a compressible gas. For this class of three-dimensional flows of a fluid, exact relationships between the solutions of the Navier-Stokes equations have been established. On the basis of these relationships the aerodynamic coefficients of the wing in a flow with slip are expressed by means of the aerodynamic coefficients of a wing in a flow without slip. In a compressible gas such relationships have been established only for isothermal and adiabatic processes. A theory is developed

-Card 10/39

Collection of Theoretical Papers (Cont.) 823

for the three-dimensional boundary layer on a wing moving with slip in an incompressible fluid and in a compressible gas. The basic integral calculation methods for a two-dimensional boundary layer are generalized for the case of a three-dimensional boundary layer. For a flat plate an exact solution is obtained of the equations for a three-dimensional boundary layer in an incompressible fluid and a compressible gas. It is shown that within the boundary layer the flow of the liquid is twisted to a certain angle which varies along the height of the boundary layer and along the wing chord. This angle also depends on the Mach number. At the point of flow separation within the boundary layer the fluid flows along the wing span, causing premature flow separations for finite-span wings. The developed theory of the three-dimensional boundary layer permits calculation of all forces and moments acting on the slipping wing and investigation of the physical processes taking place within the boundary layer. The report is divided into the following sections:

Card 19/39

Collection of Theoretical Papers (Cont.) 823

Introduction; Ch. I. Three-dimensional Boundary Layer on a Slipping Wing in an Incompressible Fluid; 1. Basic aspects; 2. Exact relationships between solutions of hydrodynamic equations; 3. Boundary-layer equation; 4. Application of Pohlhausen's method; 5. Application of asymptotic methods; 6. Exact solution for a plate; Ch. II. Three-dimensional Boundary Layer on a Slipping Wing in a Compressible Gas; 1. Basic aspects; 2. Exact relationships between solutions of gas-dynamic equations; 3. Equation for boundary layer in a compressible gas; 4. Application of Pohlhausen's method; 5. Application of asymptotic methods; 6. Exact solution for a plate. The report contains 10 figures and 4 tables. There are 6 references, of which 5 are Soviet and 1 English.

Sokolova, I.N. Temperature of a Plate in Supersonic Flow, Taking Radiation Into Account

206

Card 20/33

Collection of Theoretical Papers (Cont.) 823

into the following sections: Introduction; 1. Basic equations; 2. Generalization of Pohlhausen's method; 3. Generalization of asymptotic methods; 4. More precise calculation method for the unsteady boundary layer; 5. Exact solution for a plate; 6. Unsteady boundary layer on bodies of revolution. The report contains 7 figures and 5 tables. There are 4 references, of which 2 are Soviet, 1 English and 1 German.

Struminskiy, V.V. and Lebed', N.K. Method of Calculating the Circulation Distribution Along the Span of a Sweptback Wing 253
The report, first published in 1952, describes a new method for calculating the circulation distribution along the span of sweptback wings. With the new method it is possible to determine the circulation at a large number of calculated sections of a wing. This considerably increases the accuracy of the calculation and permits a sufficiently reliable determination of the circulation of sweptback wings with flaps

Card 23/33

Collection of Theoretical Papers (Cont.) 823

and ailerons, and also of the damping properties of swept-back wings. The report is divided into the following sections:
1. Basic aspects; 2. Basic equations of the sweptback wing;
3. Effect of the compressibility of the air on the aerodynamic characteristics of sweptback wings; 4. Method of solving the wing equation; 5. Calculation of the aerodynamic characteristics of sweptback wings; 6. Sequence of calculation of the circulation distribution along the span of sweptback wings; 7. Sample calculation for a sweptback wing; Appendix. The report contains 21 figures, 4 tables, and 5 forms of calculation sequences. There are no references.

Chushkin, P.I. Calculation of the Circulation Distribution Along Rectangular Wings of Low Aspect Ratio 287

The report, first published in 1949, presents a method of calculating the circulation along rectangular wings of low aspect ratio. The wing is replaced by a series of vortex filaments u-

~~Card 24733~~

VLASOV, V. V.

"Theory of the non-steady state boundary layer."

In this paper the general theory of the non-steady state boundary layer on cylindrical bodies of any cross section and on solids of revolution is expounded. A generalisation is given of the main integral methods of calculation of the steady state boundary layer to the case of calculation of an arbitrary non-steady state boundary layer. A new integral method of calculation of the boundary layer was evolved which takes fully into consideration the features of the non-steady state processes. For a flat plate an accurate solution was found of the equations of the non-steady state layer. The general relations between the characteristics of the non-steady state boundary layer obtained in this paper enabled establishing the particular role of the relative acceleration from the point of view of the non-steady state movement of a liquid. It is shown that a positive relative acceleration brings about a tear-free flow past the wing, whilst a negative acceleration brings about a tearing off of the flow. A variable magnitude of the relative acceleration leads to a variable separation of vortices from the wing surface. On the basis of qualitative relations obtained in the paper, the influence of non-steady state movement of an aircraft on its aerodynamic data is determined.
(First published in 1948)

Symposium of Theoretical Work on Aerodynamics, Oborongiz, 1957, 3,000 copies
Central Aero-Hydrodynamics Inst. imeni Prof. N. E. Zhukovskiy.

STREAMLINES V

S/124/60/000/01/06/011
A005/A001 82176

10, 1900

Translation from: Referativnyy zhurnal, Mekhanika, 1960, No. 1, p. 88, # 703

AUTHOR: Struminskii, V. V.

TITLE: The Theory of Three-Dimensional Boundary Layer on the Sliding Wing

PERIODICAL: Sb. teor. rabot po aerodinamike. Moscow, Obozr. 1957, pp. 174-205

TEXT: The author studies some properties of a flow of compressible and incompressible fluid around an infinite-span wing, rectangular in horizontal projection, under a slip angle. The stream parameters in such a flow vary only in the plane orthogonal to the wing generatrix, i. e., they depend only on two variables. The full Navier-Stokes-equation system decomposes into two equations in case of an incompressible fluid; the first closed system, which correlates the pressure with the velocity components in the above-mentioned plane, is analogous to the Navier-Stokes system for a two-dimensional motion and may be solved independently. The second system consists of a single equation for the velocity component along the span. In this case, the aerodynamic coefficients c_x , c_y and m (the x-axis is parallel to the wing chord, the z-axis is parallel to the span, the y-axis is

Card 1/2

X

82176

S/124/60/000/01/06/011
A005/A001**The Theory of Three-Dimensional Boundary Layer on the Sliding Wing**

perpendicular to the x- and z-axes) may be expressed by the corresponding coefficients for the zero slipangle. The experimental corroboration of this fact is given. In case of a compressible gas, all quantities are connected by the energy equation, and the above-mentioned property of the quantities c_x , c_y , and m_z is valid only for adiabatic and isothermal flow. The equation system of the boundary layer is given. In the general case, when a pressure gradient is present, the equations are solved by the integral correlation methods, and the generalizations of the Pohlhausen- and Kochin-Loytsyanskiy methods to the three dimensional boundary layer are considered. For these purposes, two "conditional thicknesses" of the boundary layer are introduced, which appear in the profiles of the component velocities along the x- and z-axes. The Prandtl number for a compressible gas is assumed to be equal to unity, and the Dorodnitsyn variables are introduced. Rigorous self-modeling solutions of the equations of the boundary layer on a plate being flowed around with slippings are discussed. In contrast to the case of pressure gradient, the velocity vector within the boundary layer on the plate has the same direction as the incident stream, and the three-dimensional boundary layer degenerates to a two-dimensional one.

Card 2/2

V. V. Lunev

✓

S/124/62/001/003/012/01
A005/A001

82354

A005, No. 3, p. 70, # 3412

82354

10.2000

Translation from Referativnyy zhurnal, Mekhanika, 1962, No. 3.

AUTHOR:

Struminskii, V. V.

TITLE:

The Theory of Unsteady Boundary Layer¹

PERIODICAL:

St. teor. rabot po aerodinamike. Moscow, Gostorgiz, 1957, no. 250-252

TEXT: The work describes an investigation of the unsteady boundary layer of an incompressible liquid. The generalization of the fundamental integral method (Forsius) is given with application to the case in question. Tables and graphs of the form-parameter functions appearing in the case in question are presented. The problem of the boundary layer on a plate infinite at both sides is solved by the Fornhausen method: it is assumed that the speed U of the liquid flowing around the plate varies in time according to the law:

$$U = U_0 e^{\pm \beta t} \quad (\beta > 0) \quad (U_0, \beta = \text{constant})$$

The approximate solution obtained for the friction stress was compared with the

Card 1/3

32354

S/124/60/000/003/012/017

A005/A001

The Theory of Unsteady Boundary Layer

corresponding rigorous solution of the Navier-Stokes equation. It turned out that they coincide satisfactorily within the zone remote from the separation point. The problem of the boundary layer on a plate is solved by the Prandtl method in case of a flow speed varying according to the law:

$$U = U_0 \text{ for } t < 0, \quad U = U_0 \text{ for } t \geq 0.$$

It is shown that the boundary layer in the section

$$0 < x < x_0 \quad (x_0 = \frac{2}{3} \cdot \frac{37}{63} U_0 t)$$

at the instant t is the same as at the steady flow around the plate, and at $x > x_0$ the boundary layer is the same as it is on a plate, infinite at both sides, being followed around with speed U . The part played by the relative acceleration and the acceleration effect on the boundary layer separation are stated. A special integral method is proposed, which better takes into account, in the author's opinion, the specific features of unsteady processes. The equation of the boundary layer for the stream function is reduced, in case of a plane plate and a flow speed varying in time according to a power- and exponential law, to an equation containing only two combinations of independent variables. The author proposes to solve the latter equations by series, the coefficients of

Card 2/3

20-2-10/60

AUTHOR: Struminskiy, V. V.

TITLE: The Equations of a Tridimensional Boundary Layer in a Compressible Gas for an Arbitrary Surface (Uravneniya trekhmernogo pogranichnogo sloya v szhimayemom gaze dlya proizvol'noy poverkhnosti)

PERIODICAL: Doklady Akademii Nauk SSSR, 1957, Vol. 114, Nr 2, pp.271-274 (USSR)

ABSTRACT: The present paper furnishes the strict derivation of these equations and gives transformations which bring these equations to a form analogous to the equations in a tridimensional layer in a viscous incompressible liquid. The equations of motion of the viscous compressible gas are written down in nondimensional quantities. As scales the author selects the values of velocity, density, pressure of the absolute temperature, the coefficient of viscosity and the thermal conductivity in a certain point of the flow. A characteristic measure of the surface to be flown round serves as scale of length. The complete system of the equation of motion of the viscous gas, corresponding to this case, is written down here in the

Card 1/3

20-2-10/60

The Equations of a Tridimensional Boundary Layer in a Compressible Gas for an
Arbitrary Surface

PRESENTED: December 4, 1956, by A. A. Dorodnitsyn, Academician

SUBMITTED: November 28, 1956

AVAILABLE: Library of Congress

Card 3/3

STRUMINSKIY, V. V. (Moscow)

"A contribution to the Theory of Turbulence."

report presented at the First All-Union Congress on Theoretical and Applied Mechanics, Moscow, 27 Jan - 3 Feb 1960.

"APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9

STRUMINSKIY, V. V. (Moscow)

"The State of the Art in the Analysis of Supersonic Flows Past Bodies."

**report presented at the First All-Union Congress on Theoretical and Applied
Mechanics, Moscow, 27 Jan - 3 Feb 1960.**

APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9"

S/179/62/000/006/003/022
E032/E114

AUTHORS: Struminskij, V.V., and Filippov, V.M. (Moscow)

TITLE: An experimental study of light-scattering phenomena
in the laminar and turbulent flow of a liquid

PERIODICAL: Akademiya nauk SSSR. Izvestiya. Otdeleniye
tekhnicheskikh nauk, Mekhanika i mashinostroyeniye,
no.6, 1962, 10-16

TEXT: The scattering of light in a stream of water flowing
through a tube of constant diameter (1.5 mm) was investigated,
using the apparatus illustrated schematically in Fig.2. The
velocity of the water was measured with the aid of a specially
developed ultramicroscope with a rotating mirror. The mirror is
set up between the objective and the eyepiece. At a certain
velocity of rotation of the mirror about an axis perpendicular to
the direction of motion of the liquid and the optical axis of
the objective, the trajectories of particles suspended in
the liquid will appear as luminous points in the field of view.
The velocity of motion of the image and the velocity of
displacement of the image due to the rotation of the mirror are

Card 1/4

An experimental study of light- ...

S/179/62/000/006/003/022
E032/E114

then equal and opposite. In this way velocities between a few mm/sec and 1 m/sec can be determined with adequate accuracy. The tube (7) in which the flow was investigated was inserted into a wider tube, as illustrated in Fig. 1. Measurements of the velocity profile with the aid of a Pitot tube in the larger tube (square cross section) in the case of turbulent motion confirmed existing experimental data. It was found that the transition from laminar to turbulent flow was accompanied by a considerable change in the characteristics of the scattered light. Thus, turbulent flow gave rise to considerable pulsations in the amplified output signal of the light detector, which were absent in the case of rather slow flow. It was found that the relative change in the a.m.s. value of the pulsating component of the scattered light

$$\lambda = \left(\sqrt{\langle i^2 \rangle} / I \right) \cdot 100$$

remained zero up to an axial velocity $u_0 \approx 20$ cm/sec and then rose steeply in the transition region between laminar and turbulent flow, finally reaching a steady value. The addition of Card 2/4

An experimental study of light- ... S/179/62/000/006/003/022
E032/E114

soluble salts to the water was found to have no effect on the critical velocity. The magnitude of the pulsating component was found to depend on the scattering angle. An experimental study was also made of the frequency distribution of the energy of the pulsating component of the scattered light. It was found that a change in the axial velocity u_0 leads to a considerable change in the spectrum of the pulsating component. At low values of u_0 approaching the critical velocity, most of the energy is concentrated in the low frequency region. With increasing velocity, the energy of the turbulent pulsations shift towards higher frequencies, finally reaching several hundred c.p.s. There are 11 figures.

SUBMITTED: July 30, 1962

Card 3/4

Stru M. Oskoy, V. V.

PHASE I BOOK EXPLOITATION

SOV/6201

65

Vsesoyuznyy s"yezd po teoreticheskoy i prikladnoy mehanike. 1st, Moscow, 1960.

Trudy Vsesoyuznogo s"yezda po teoreticheskoy i prikladnoy mehanike,
27 yanvarya -- 3 fevralya 1960 g. Obzornyye doklady (Transactions of the
All-Union Congress on Theoretical and Applied Mechanics, 27 January to
3 February 1960. Summary Reports). Moscow, Izd-vo AN SSSR, 1962.
467 p. 3000 copies printed.

Sponsoring Agency: Akademiya nauk SSSR. Natsional'nyy komitet SSSR po
teoreticheskoy i prikladnoy mehanike.

Editorial Board: L. I. Sedov, Chairman; V. V. Sokolovskiy, Deputy Chairman;
G. S. Shapiro, Scientific Secretary; G. Yu. Dzhanelidze, S. V. Kalinin,
L. G. Loytsyanskiy, A. I. Lur'ye, G. K. Mikhaylov, G. I. Petrov, and
V. V. Rumyantsev; Resp. Ed.: L. I. Sedov; Ed. of Publishing House:
A. G. Chakhirev; Tech. Ed.: R. A. Zamarayeva.

Card 1/6

Transactions of the All-Union Congress (Cont.)

SOV/6201

(25)

PURPOSE: This book is intended for scientific and engineering personnel who are interested in recent work in theoretical and applied mechanics.

COVERAGE: The articles included in these transactions are arranged by general subject matter under the following heads: general and applied mechanics (5 papers), fluid mechanics (10 papers), and the mechanics of rigid bodies (8 papers). Besides the organizational personnel of the congress, no personalities are mentioned. Six of the papers in the present collection have no references; the remaining 17 contain approximately 1400 references in Russian, Ukrainian, English, German, Czechoslovak, Rumanian, French, Italian, and Dutch.

TABLE OF CONTENTS:

SECTION I. GENERAL AND APPLIED MECHANICS

• Artobolevskiy, I. I. Basic Problems of Modern Machine Dynamics	5
• Bogolyubov, N. N., and Yu. A. Mitropol'skiy. Analytic Methods of the Theory of Nonlinear Oscillations	25

ard 2/6

Transactions of the All-Union Congress (Cont.)	SOV/6201
Sretenskiy, L. N. Review of Reports on the Theory of Tides	213
Struminskiy, V. V. Present State of the Problem of Supersonic Gas Flow Past Bodies	225
SECTION III. MECHANICS OF RIGID BODIES	
Berezantsev, V. G. The Theory of Limiting State of Stress in Soil Mechanics and Its Applications	299
Vekua, I. N., and N. I. Muskhelishvili. Methods of the Theory of Analytic Functions in the Theory of Elasticity	310
Gol'denveyzer, A. L. Development of the Theory of Elastic Thin Shells	339

Card 5/6

L 14980-63

EPA(b)/EWT(1)/BDS AFFTC/ASD Pd-4

ACCESSION NR: AP3005428

S/0020/63/151/005/1046/1049

AUTHOR: Struminskiy, V. V. (Corr. member, AN SSSR) 56

TITLE: On the nonlinear theory of aerodynamic stability,

SOURCE: AN SSSR. Doklady*, v. 151, no. 5, 1963, 1046-1049

TOPIC TAGS: nonlinear theory, laminar-flow stability, stability boundaries, laminar flow, viscous flow, successive approximation method, recurrent equation, small-parameter method, successive approximation

ABSTRACT: The small-parameter, or successive approximation, method is applied to the study of the aerodynamic stability of laminar flow. The two-dimensional flow of viscous, incompressible fluid between two parallel surfaces and the laminar flow on the surface of a body are considered, and stability conditions are analyzed. The first approximation coincides with general linear theory, whereas for successive approximations a recurrent system of ordinary differential equations is obtained. It is shown that the stability boundaries and the nature of changes of perturbation in time in successive approximations are determined by the first linear approximation. "The author expresses his thanks to Academician A. A. Dorodnitsyn for valuable observations concerning this work." Orig. art. has:

Card 1/21

16 formulas.

STRUMINSKIY, V.V.

Nonlinear theory of the development of aerodynamic perturba-
tions. Dokl. AN SSSR 153 no.3:547-550 N '63.
(MIRA 17:1)

1. Chlen-korrespondent AN SSSR.

"TRUMISKY, V.V. (Moscow)

"Contribution to the non-linear theory of aerodynamic perturbation development"

Report presented at the 2nd All-Union Congress on Theoretical and Applied Mechanics, Moscow 29 Jan - 5 Feb 64.

STRUMINSKY, V.V.; FILIPPOV, V.M. (Moscow)

"On some singularities of turbulent flows"

Report presented at the 2nd All-Union Congress on Theoretical and Applied Mechanics, Moscow 29 Jan - 5 Feb 64.

STRUMINSKIY, V.V.

Method for solving Boltzmann's kinetic equation. Dokl. AN SSSR 158 no. 2
298-301 S '64. (MIRA 17:10)

I. Chlen-korrespondent AN SSSR.

L 8862-65 EWT(1)/EPA(w)-2/EEC(t)/EEC(b)-2/EWA(e)-2 Pab-24 ASD(a)-5/
ASD(f)/AEDC(a)/ESD(dp)/ESD(t)/RAEM(t,
ACCESSION NR: AP4045093 S/0020/64/158/001/0070/0073

AUTHOR: Struminskiy, V. V.

TITLE: The Hilbert method of solving the Boltzmann kinetic equation

SOURCE: AN SSSR. Doklady*, v. 158, no. 1, 1964, 70-73

TOPIC TAGS: kinetic equation, distribution function, Euler equation, approximation method

ABSTRACT: This paper is devoted to a clarification of the region of applicability of the ordinary Hilbert small parameter method (D. Hilbert, Math. Ann. v. 72, 562, 1912) for the solution of the Boltzmann equation. It is shown that in the general forms by Hilbert, the method leads to a singular structure of the distribution function, which results in the Euler equations in the zeroth approximation, and in inhomogeneous Euler equations (in place of the Navier-Stokes equations) in the first approximation. Higher approximations do not im-

Card 1/2

L 8862-65
ACCESSION NR: AP4045093

prove the situation and also lead to inhomogeneous Euler equations. It is thus demonstrated that the possibilities of the ordinary small-parameter are highly limited. Only in some particular cases can the small-parameter method lead to a normal structure of distribution functions, characteristic of all the presently known approximate solutions of the kinetic equation. Orig. art. has: 19 formulas.

ASSOCIATION: None

SUBMITTED: 09Apr64

ENCL: 00

SUB CODE: MA

NR REF SOV: 000

OTHER: 004

Card 2/2

L 3408-66 EWT(1)/EWP(m)/FCS(k)
ACCESSION NR: AP5023358

UR/0020/65/164/001/0066/0069

17
B

AUTHOR: Struminskiy, V. V. (Corresponding member AN SSSR)

TITLE: Laws of development and stabilization of aerodynamic disturbances

SOURCE: AN SSSR. Doklady, v. 164, no. 1, 1965, 66-69

TOPIC TAGS: hydrodynamic equation, aerodynamic disturbance, turbulence development, Landau equation

ABSTRACT: The nonlinear theories in the current literature of development and stabilization of aerodynamic disturbances are discussed. It is shown that the Landau theory (L. Landau, DAN, 44, 339, 1944) which is expressed by the approximate equation

$$\frac{d}{dt} |A|^2 = 2\gamma_1 |A|^2 - \alpha |A|^4,$$

where γ_1 comes from linear theory and α = unknown constant, does not permit single-valued evaluation of the direction of disturbance development. It is also argued that the investigations of J. Stuart (J. Fluid Mech., 4, 1, 1958; 9, 3, 1960), J. Watson (J. Fluid Mech., 9, 3, 1960) and W. Eckhaus (J. Mechanique, 1, 4, 1962) derive the approximate Landau equation from the hydrodynamic equation but have not been able to evaluate the unknown constant which determines the

Card 1/2

ASSOCIA
SUBMITTED: 16Nov04

NO REF SOV: 007
Card 2/2 Mh

L 10295-66 E: (d)/E: (i)/EWA(m)-2 IJP(c)
 ACC NR: AP5028272

SOURCE CODE: UR/0020/65/165/001, 0295/0296

AUTHOR: Struminskii, V. V., (Corresponding member AN SSSR)

ORG: none

TITLE: On the structure of solutions of a chain of equations in kinetic theory of gases

21, 44, 55

SOURCE: AN SSSR. Doklady, v. 165, no. 2, 1965, 293-296

TOPIC TAGS: rarefied gas dynamics, gas kinetic equation, Hamiltonian, approximation method, asymptotic expansion, velocity distribution function

ABSTRACT: The structure of the solution of a set of kinetic equations using the reduced distribution function concept is discussed. Starting with the Liouville equation, a reduced distribution function F_s is defined

$$F_s(t, x_1, \dots, x_s) = V^s \int \dots \int F_N dx_{s+1} \dots dx_N$$

which, when applied to the Liouville equation, generates the BBGKY hierarchy

$$\frac{\partial F_s}{\partial t} = \mathcal{H}_s F_s + \frac{N-s}{V} \sum_{k=1}^{N-s} \iint U_{ks+1} F_{s+1} dx_{s+1}$$

The reversible or irreversible nature of this equation is discussed on the basis of a Card 1/2

UMC: 533.72

L 10295-66 APPROVED FOR RELEASE: 08/26/2000 CIA-RDP86-00513R001653610019-9
 ACC NR: AP5028272 N-s L r_0. For more detailed analysis, a new distribution

small parameter expansion function is defined by $f_1(t_1, x_1) = \frac{N}{V} F_1(t, x_1); f_s(t, x_1, x_s) = \frac{N(N-1)}{V^2} F_s(t, x_1, x_s)$
 $f_s(t_1, x_1) = \frac{N}{V} F_1(t, x_1); f_s(t, x_1, x_s) = \frac{N(N-1)}{V^2} F_s(t, x_1, x_s)$

and the f_s are then expanded in powers of the small parameter r_0/λ . For $s \geq 2$, a second expansion is made in powers of ϵ where $f_s(t) = f_s(t_1, x_1, \dots, x_s, \omega_1, \dots, \omega_s)$

such that the distribution function f is represented in multiple time scales taking into account fast as well as slow gas kinetic processes. This is accomplished by the dependence of ω_k on t $\frac{\partial \omega_k}{\partial t} = eA_k + eB_k + eC_k + \dots$

Orig. art. has: 12 equations.
 SUB CODE: 20/ SUBM DATE: 08Jul65/ ORIG REF: 005/ OTH REF: 004
 12

OC
 1/2

L 45139-66 EWT(1)/EWT(m) IJP(c)
 ACC NR: AP6024407 SOURCE CODE: UR/0020/66/169/001/0058/0061

AUTHOR: Struminskiy, V. V. (Corresponding member AN SSSR)

ORG: none

TITLE: Solution by series of the equations of the kinetic theory of
gases

SOURCE: AN SSSR. Doklady, v. 169, no. 1, 1966, 58-61

TOPIC TAGS: gas kinetic equation, mathematic analysis

ABSTRACT: The article proposes a new method for solution of kinetic gas equations, and demonstrates mathematically that the distribution functions depend in a different manner on fast, reversible and slow irreversible processes. The basic series for the kinetic equations is written in the form:

$$\frac{\partial f_s}{\partial t} = H_s f_s + \epsilon \iint V_{s+1} f_{s+1} dx_{s+1} \quad (1)$$

where ϵ is a small auxiliary parameter. It is assumed that

$$f_s = f_s^{(0)} + \epsilon f_s^{(1)} + \epsilon^2 f_s^{(2)} + \dots \quad (2)$$

$$f_s(t) = f_s(t, x_1, \dots, x_s, \omega_1, \dots, \omega_s). \quad (3)$$

UDC: 533.72

Card 1/2

L 45139-66

ACC NR: AP6024407

In this case, Equation (1) leads to the system of equations

$$\begin{aligned} \left(\frac{\partial f_s^{(0)}}{\partial t} \right)_\omega &= H_s f_s^{(0)}, \\ \left(\frac{\partial f_s^{(1)}}{\partial t} \right)_\omega &= H_s f_s^{(1)} - A_k \frac{\partial f_s^{(0)}}{\partial \omega_k} + \iint_{\xi=r_k+v_k t} W_{s+1} f_{s+1}^{(0)} dx_{s+1}, \end{aligned} \quad (4)$$

where

$$\frac{\partial \omega_k}{\partial t} = \left(\frac{df_1}{dt} \right)_\xi = \iint_{\xi=r_k+v_k t} W_1(\xi, v_k, x_1) f_1(t, \xi, v_k, x_1) dx_1. \quad (5)$$

The article proceeds to the solution of this system of equations by substitution of dimensionless variables and expansion into series.
Orig. art. has: 22 formulas.

SUB CODE: 20/ SUBM DATE: 28Jul65/ ORIG REF: 004/ OTH REF: 002
/2/

Card 2/2

1954-1964, 3

7

5/5
315.L
.390

Tekhnika i promstallurgii v SSSR (The History of
Ferrous Metallurgy in USSR) Moscow, Akademiya Nauk SSSR,
v. tables.
Alt head of title: Akademiya Nauk SSSR.
Bibliographical footnotes.
Lib. note: v. 1

STRUMINSKIY, V. YA.

N/5
831.1

Ocherki po istorii nachal'nogo obrazovaniya v Rossii (Outline history of elementary education in Russia, by) N. A. Konstantinov (i) V. Ya. Struminskiy. 2. izd., ispr. i dop. Moskva, Uchpedgiz, 1953.

.X8
1953

271 p. illus., ports.

At head of title: Akademiya Pedagogicheskikh Nauk RSFSR.

Bibliographical footnotes.

СТАДИЯ, А. А. (Бюл. ср. вет. службы.)

"Sanitary evaluation of drinking water."

SC: Veterinariya 2: (7), 1987, p. 49

STRUMPE, A.I., kandidat veterinarnykh nauk.

Polyavitaminosis in swine. Veterinariia 31 no.6:33-37 Je '54.
(MLRA 7:6)

1. Genicheskaya mezhrayonnaya vетbaklaboratoriya Khersonskoy
oblasti.

STRUMPL, A. I. (Cand. of Vet. Scis.)

"Anaerobic enterotoxemia of sheep." (A review)

SO: Vet. 25 (7), 148, p 22

СТРАНЕН, И. И. (C. d. of Vet. Sci.)

Polyavitaminosis of swine.

SC: TABCON Veterinariya, Vol. 31; No. 6; June 1954 Unclassified.

Genicheskaya Interrayon veterinary bacteriological laboratory, Kherson oblast.

STRUMENSKI, V.I.

20619. STRUMENSKI, V.I. Smitskaya otsenka pit'yevoy vely. Avtoreferat. V tsentr. nauchno-tekhnicheskaya biblioteka po oborone i voennoj promstvosti SSSR. No. 7. S. 47
1949, No. 7. S. 47

SG: LITOPIS' No. 20, 1949

STRUMPE, A. I.
USSR/Medicine - Veterinary

2- 312

Card 1/1

Author : Strumpe, A. I., Candidate of Veterinary Sciences

Title : Polyavitaminosis of hogs

Periodical : Veterinariya, 6, 33-37, June 1954

Abstract : Results of 20 years of observation revealed that polyavitaminosis in hogs is an acute, lingering disease; it affects a large number of hogs of all ages mainly during winter and spring. The disease often occurs in hogs that have been fed rations deficient in vitamins. Hogs deficient at birth are usually slow to develop, suffer from a physical deformity, and often fail to survive. Organism of hogs which have been weakened by vitamin deficiency becomes susceptible to disease, particularly to erysipelas, even after they are vaccinated against the disease with immune serum. Understanding the conditions under which vitamin deficiency is likely to occur and prompt recognition of early symptoms of the deficiency are essential in order to eliminate losses caused by polyavitaminosis.

Institution : Genicheskaya Interrayon Veterinary Bacteriological Laboratory, Khersonskaya Oblast

Submitted : The report was read at the 6th interschool scientific-industrial conference of the Veterinary Institute, Kiev, May 26-28, 1952

STRUMPE, P.L., otvetstvenny red.; NOVIKOV, A.F., kand.tekhn.nauk, nauchnyy
red.; RANIS, A.A., red.; TOTOK, A.G., red.; DROZHZHINA, L.P., tekhn.
red.

[Preserving pile timbers from marine borers and rotting] Antisepti-
rovaniye gidrotekhnicheskogo svainogo lesa protiv morskikh drevotoch-
tsev i gnienia. Leningrad, Izd-vo "Morskoi Transport," 1958. 84 p.
(Leningrad. TSentral'nyi nauchno-issledovatel'skii institut morskogo
flota. Trudy no.18) (MIRA 11:11)

(Wood--Preservation) (Piling (Civil engineering))

STRUMPE, P.I., kand.tekhn.nauk, red.; OSMOLOVSKIY, A.K., kand.tekhn.nauk,
nauchnyy red.; TOTOK, A.G., red.; KOTLYAKOVA, O.I., tekhn.red.

[Method of calculating strength of merchant ships] Metodika rascheta
prochnosti morskikh transportnykh sudov.(Leningrad, Izd-vo "Morskoi
transport", 1958. 127 p. Leningrad. TSentral'nyi nauchno-issledovatel'-
skii institut morskogo flota. Trudy no. 17) (MIRA 11:11)
(Ships)

STRUMPE, Petr Ivanovich, kand.tekhn.nauk; YAKUSHENKOV, Andrey Andreyevich,
kand.tekhn.nauk; SYROMYATNIKOV, Viktor Fedorovich, kand.tekhn.nauk;
RAPOPORT, Leonid Il'ich, kand.tekhn.nauk; MILESHKIN, Georgiy
Aleksandrovich, kand.tekhn.nauk; MIROSENICHENKO, Il'ya Petrovich,
kand.tekhn.nauk; ARAKELOV, Vladimir Mikhaylovich, inzh.; SKOMO-
ROVSKIY, Rostislav Vsevolodovich, kand.tekhn.nauk; PESOCHINSKIY,
Viktor Nikolayevich, kand.tekhn.nauk; NELDOVA, E.S., red.; TIKHO-
NOVA, Ye.A., tekhn.red.

[Over-all mechanization and automatization in the merchant marine]
Kompleksnaia mekhanizatsiia i avtomatizatsiia na morskem transporte.
Pod obshchei red. P.I.Strumpe. Moskva, Izd-vo "Morskoi transport,"
1959. 95 p. (MIRA 13:5)

(Merchant marine--Equipment and supplies)
(Cargo handling--Equipment and supplies)
(Automatic control)

BARDINA, V.; ZOBACHEV, Yu.; KUZNETSOV, V.; SHCHERBAKOV, P.; STRUMPE, P.I.,kand.
tekhn.nauk, otv.red.; ARAKELOV, V.M.,nauchnyy red.; PRESMAN, D.Ya.,red.;
FRISHMAN, Z.S.,red.izd-va; KOTLYAKOVA, O.I.,tekhn.red.

[Protection of tanks used on oil tankers] Protektornaya zashchita
tankov neftentalivnykh sudov. Leningrad, Izd-vo Morskoi.transport.
1959. 47 p. (Leningrad. tsentral'nyi nauchno-issledovatel'skii
institut morskogo flota. Trudy no.24) (MIRA 12:5)
(Tank vessels) (Tanks) (Corrosion and anticorrosives)

STRUMPE, P.I.

GLIKMAN, L.A.; KOSTROV, Ye.N.; SUPRUN, L.A.; YELIN, I.A.; SHCHERBAKOV, P.S.; ZOBACHEV, Yu.Ye.; DOBRER, V.K.; STRUMPE, P.I., kand.tekhn.nauk, otv. red.; ARAKELOV, V.M., nauchnyy red.; BAMA, N.G., red.; KOTLYAKOVA, O.I., tekhn.red.

[Organization and technology of ship repair; corrosion and mechanical strength of metals] Organizatsiia i tekhnologiiia sudoremonta; voprosy korrozionno-mekhanicheskoi prochnosti metallov. Leningrad, Izd-vo Morskoi transport 1959. 76 p. (Leningrad. tsentral'nyi nauchno-issledovatel'skii institut morskogo flota. Trudy no.22) (MIRA 12:5)
(Metals--Testing) (Corrosion and antcorrosives)

STRUMPE, P.I., kand.tekhn.nauk; SYROMYATNIKOV, V.F., kand.tekhn.nauk,
nauchnyy red.: YAKUSHENKOV, A.A., kand.tekhn.nauk, nauchnyy red.;
FOMICHEV, A.G., spetsred.; KOTLYAKOVA, O.I., tekhn.red.

[Over-all automatic control on seagoing ships] Kompleksnaya
avtomatizatsiya morskikh sudov. Pod obshchei red. P.I.Strumpe.
Leningrad, Izd-vo "Morskoi flot," 1960. 178 p.

(MIRA 14:4)

1. Russia (1923- U.S.S.R.) Ministerstvo morskogo flota.
2. Tsentral'nyy nauchno-issledovatel'skiy institut morskogo flota
(for Strumpe, Syromyatnikov, Yakushenkov).
(Ship handling) (Automatic control)

AFANAS'YEV, Konstantin Arkad'yevich, inzh.; GREGCHIN, Modest Alekseyevich, inzh.; KORCHAGIN, Mikhail Ivanovich, kand.tekhn.nauk; LOJINOV, Sergey Petrovich, kand.ekon.nauk; MIROSENICHENKO, Il'ya Petrovich, kand.tekhn.nauk; RAPOPORT, Leonid Il'ich, kand.tekhn.nauk; SYROMYATNIKOV, Viktor Fedorovich, kand.tekhn.nauk. Prinimali uchastiye: RAYEVSKAYA, Ye.A., inzh.; GRIGOR'YEV, Ya.I., inzh. STRUMPE, P.I., red.; MARCHUKOVA, M.G., red.issd-vs; LAVRENOVA, N.B., tekhn.red.

[Modernization of seagoing cargo vessels] Modernizatsiya morskikh transportnykh sudov. Pod obshchei red. P.I. Strumpe. Moskva, Izd-vo "Morskoi transport," 1960. 306 p.

(MIRA 14:1)

(Freighters--Equipment and supplies)

STRUMPE, P.I., kand. tekhn. nauk, stv. red.; DR NITSIN, A.I.,
kand. tekhn. nauk, nauchn. red.; KHACHIR, F.P., inoch.;
nauchn. red.; GOROBETS, V.A., red.

[Basic research] Osnovnye nauchnye issledovaniia. Le-
ningrad, Izd-vo "Morskoi transport," 1961. 107 p.
(MISA 17:10)

J. Leningrad. TSentral'nyy nauchno-issledovatel'skiy
institut morskogo flota. 2. Direktor TSentral'nogo nauchno-issledo-
vateль skogo instituta morskogo flota, Leningrad (for Strumpe).

STRUMPE, P., kand.tekhn.nauk

Science is being called upon to serve the merchant marine.
Mor. flot 21 no.10:16-19 0 '61. (MIRA 14:9)

1. Direktor TSentral'nogo nauchno-issledovatel'skogo
instituta mokhanicheskoy obrabotki dereva.
(Merchant marine--Technological innovations)

STRUMPE, F.I., kand.tekhn.nauk, otv.red.; KHABUR, B.P., inzh., nauchnyy red.;
SUSHKOVA, T.I., red.; KOTLYAKOVA, O.I., tekhn.red.

[Economic aspects and operation of the merchant marine; present state and trends in the expansion of the marine passenger fleet in capitalist countries] Ekonomika i ekspluatatsiya morskogo flota; sovremennoe sostoianie i tendentsii razvitiia morskogo passazhirskogo flota kapitalisticheskikh stran. Leningrad, Izd-vo "Morskoi transport," 1961. 67 p. (Trudy, no.33). (MIRA 14:8) (Steamboats--Passenger accomodations) (Shipbuilding)

STRUMPE, P., kand.tekhn.nauk

Problems of the future fleet and its automation. Mer. flot 21
no. 6:1-5 Je '61. (MIRA 14:6)

1. Direktor TSentral'nogo nauchno-issledovatel'skogo instituta
morskogo flota.
(Merchant marine) (Automation)

STRUMPE, P.I., kand. tekhn. nauk, otv. red.; OSMOLOVSKIY, A.K., kand. tekhn. nauk, nauchnyy red.; SUSHKOVA, T.I., red.; KOTLYAKOVA, O.I., tekhn. red.

[Guide to the control of a ship's seaworthiness by the ship's personnel and by means available on board] Rukovodstvo po nablyudeniiu za morekhodnost'iu sudna silami i sredstvami sudovogo sostava. Leningrad, Izd-vo "Morskoi transport," 1962. 22 p.
(MIRA 16:1)

1. Leningrad. TSentral'nyy nauchno-issledovatel'skiy institut morskogo flota. 2. Direktor TSentral'nogo nauchno-issledovatel'skogo instituta morskogo flota (for Strumpe). 3. Chlen prezidiuma Leningradskogo Basseynovogo pravleniya Nauchno-tehnicheskogo otdela vodnogo transporta (for Osmolovskiy).
(Ship propulsion) (Stability of ships)

LEVIN, B.M., kand. tekhn. nauk; PERSHIKOV, L.F.; GOL'DENFON, A.K.,
kand. tekhn. nauk; AFANAS'YEV, K.A.; STRUMPE, P.I., kand.
tekhn. nauk, otv. red.; SUSHKOVA, T.I., red.; KOTLYAKOVA,
O.I., tekhn. red.

[Methods of testing thermodynamic processes in marine steam
turbine plants] Metodika teplotekhnicheskikh ispytanii sudovykh
paroturbinnykh ustyanovok. Leningrad, Izd-vo "Morskoi trans-
port," 1962. 118 p. (MIRA 16:9)

1. Leningrad. TSentral'nyy nauchno-issledovatel'skiy institut
morskogo flota.
(Steam turbines, Marine)

STRONIE, P.I., kand. tekhn. nauk, otv. red.; ZAGORSKAYA, Ye.P.,
kand. tekhn. nauk, nauchn. red.; RAMIS, A.A., red.;
GUL'CHIKOVA, N.F., tekhn. red.

[Industrial safety and the improvement of working conditions in the merchant marine] Tekhnika bezopasnosti i uluchshenie usloviy truda na morskem flote. Leningrad, Izd-vo "Morskoi transport," 1963! 96 p. [Issued "instead of" Its:
Trudy, no.40]

(MIRA 16:12)

(Merchant marine--Safety measures)

(Merchant seamen--Diseases and hygiene)

YANITOV, I.N., kand.tekn.nauk, AVTOVIZSIL, senior engineer,
nauknyy reed.; KALININ, E.I., kand.tekn.nauk, senior eng.
KALININ, V.A., senior.vizyon.-meristem, reed.; KERZON, N.,
I.V., kand.tekn.nauk, reed.; KUDRIATOV, A.V., kand.tekn.nauk
reed.; KURZON, A.G., doktor tekh.nauk, senior.rukh. "AVTOVIZSIL";
N.I., kand.tekn.nauk, reed.; OVRUTSKII, V.P., kand.tekn.
nauk, reed.

"Automation of power plants on cargo ship navigation ships.
Avtomatizatsiya silovykh ustroystv na poiski transporta na
sudov. Leningrad, Izd-vo "Morskoi transport", 1962. 3 p.
(Leningrad, Tsentralnyi nauchno-tekhnicheskii institut
morskogo flota, Informatsionnyi otdel, no. 4. "MFA-19")

GOLOVIZNIN, A.M., kand.tekhn.nauk; GOL'DENFON, A.K., kand.tekhn.nauk;
GRIGOR'YEV, G.T.; KORNYAYEV, Yu.T.; SRABOV, K.Ye.; STRUMPE, P.I.,
kand.tekhn.nauk, otv.red.; DRANITSYN, S.N., kand.tekhn.nauk, red.;
GOROBETS, V.A., kand.voyen.-morskikh nauk, red.; YEVREINOV, I.V.,
kand.tekhn.nauk; KORCHAGIN, M.I., kand.tekhn.nauk; KURZON, A.G.
doktor tekhn.nauk; MIROSHNICHENKO, I.P. ~~kand.tekhn.nauk;~~
ROZHDESTVENSKIY, N.A., kand.tekhn.nauk; SYROMYATNIKOV, V.F.,
kand.tekhn.nauk; BAMA, N.G., red.; STUL'CHIKOVA, N., tekhn.red.

[Marine nuclear steam turbine plants.] Sudovye iadernye
proturbinnye ustavovki. Leningrad. Izd-vo "Morskoi transport,"
1963. 135 p. Leningrad, TSentral'nyi nauchno-issledovatel'skiy
institut morskogo flota. Informatsionnyi stornik, no. 77/78.
Tekhnicheskaya ekspluatatsiya morskogo flota, no. 15/16).
(MIRA 17:2)

1. Sotrudnik TSentral'nogo nauchno-issledovatel'skogo
instituta morskogo flota (for Goloviznin, Gol'denfon,
Grigor'yev, Korniyayev, Srabov).

STRUMPE, P.

Increase the role of scientific and technological societies in scientific institutions. NTO 6 no.1:27-28 Ja '64. (MIRA 17:2)

1. Direktor TSentral'nogo nauchno-issledovatel'skogo instituta morskogo flota.

L 09050-67

ACC NR: AR6032251

(N) SOURCE CODE: UR/0398/66/000/006/A004/A004

AUTHOR: Strumpe, P. I.; Miroshnichenko, I. P.; Krayev, V. I.; Fel'dman, I. A.

TITLE: Future types of transport ships and the basic problems of improving their technical operating characteristics 6

SOURCE: Ref. zh. Vodnyy transport, Abs. 6A18

REF SOURCE: Tr. Tsentr. n.-i. in-ta morsk. flota, vyp. 67, 1965, 3-11

TOPIC TAGS: ship, tanker, transport ship

ABSTRACT: Tables present the main measurements and characteristics of the basic types of transport vessels proposed by the TSNIIMF for use in the near future (1966—1970) in the Soviet maritime fleet. It is proposed that seven universal types of general cargo vessels be built with dwt of 1000—15,800 tons, two types of ore and coal carriers with dwt of 13,000 and 21,000 tons, and three types of tankers with a dwt of 4500 tons. The conditions are presented upon which the design of these ships is based, and the basic scientific problems of the development of the transport fleet, which must be solved in the near future are examined. [Translation of abstract]

SUB CODE: 13/
Card 1/1 net

UDC: 629.123.2.004.6

STRUMPE, P₁, kand.tekhn.nauk

Place the technical operation of the fleet on a scientific basis.
(MIRA 18:2)
Mor.flot 25 no.1:24-25 Ja '65.

1. Direktor TSentral'nogo nauchno-issledovatel'skogo instituta
morskogo flota.

STRUMEE, P. kand. tekhn. nauk

Improve the quality and increase the reliability of seagoing
vessels. Mor. flot 25 no.11:31-33 N '65. (MIRA 18:11)

1. Direktor TSentral'nogo nauchno-issledovatel'skogo insti-
tuta morskogo flota.

JIRIUS, V., M.

1) Sewing patterns from the 1957 International Congress of Fashion in Moscow.

2) ... (Prague, Czechoslovakia) Vol. 12, no. 3, Sept. 1957

3) Monthly Index of East European Accession (EE.I) LC Vol. 7, No. 5, 1958

STRUNA, A.

"General technical terminology in closer discussion." p. 271.. (Nova Iroizvodnya. Vol. 4,
no. 3/4, Sept. 1953. Ljubljana.)

SO: Monthly List of East European Accessions. Vol. 3, no. 3. Library of Congress. March 1954.
Uncl.

"APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9

(Soviet Union - Moscow, Leningrad, etc., May 1974, Ljubljana,
Yugoslavia)

Re: recently released documents concerning (Soviet Union, Ljubljana, etc.
May 1974, Ljubljana, etc.)

APPROVED FOR RELEASE: 08/26/2000

CIA-RDP86-00513R001653610019-9"

VNIIGSL.VNI / Chemical Technology. Chemical Products N-87
and Their Applications. Chemical Processing
of Natural Gases and Petroleum. Motor
and Rocket Fuel Lubricants.

Mag Jour: Ref Zhur-Khimiya, No 3, 1-69, 9781.

Author : Strel's, et al.

Print : Not given.

Title : The Role of Chemical and Mechanical Methods in
Testing Lubricating Materials Under Operating
Conditions.

Orig Pub: Zast.-stacer., 1968, 6, No 4, Poimnivane, 1,
No 2, VI-11--VI-13.

Abstract: A review. In characterizing methods for testing
motor oils with admixtures, it is noted
that many of their properties are insufficiently
studied and require further investigation. Bibl.
6 refs.

Card 1/1

196

STRUNA, J.

卷之二

electric power plants in the U.S., its significance for the National defense, and the economy of the U.S. Our first paper, "The Present Status of the Utilization of Nuclear Energy in the Production of Electric Power in America," was intended to call attention to the economic problem involved in the development of atomic energy. The second paper, "The Present Status of the Utilization of Nuclear Energy in the Production of Electric Power in America," was intended to call attention to the economic problem involved in the development of atomic energy.

卷之三

and Hostile. The following report is intended to give a general account of the condition of the country, and the resources of the people, and to furnish some information respecting the Krasnoyarsk district, and the districts of Irkutsk and Chita, which are situated in the same basin as the Yenisei river, and are tributaries to it. The report is based upon a collection of information obtained from a number of sources, and is intended to be a general sketch of the country, and not a detailed description of any particular place or district.

18

1000, 1.

Moder. friction, lubrication, wear. ("See cont'd.) p. 11a.

1000, 1. (cont'd.) p. 11a. (See cont'd.) p. 11a.
1000, 1. (cont'd.) p. 11a. (See cont'd.) p. 11a.
1000, 1. (cont'd.) p. 11a. (See cont'd.) p. 11a.
1000, 1. (cont'd.) p. 11a.

1000, 1. (cont'd.) p. 11a.
1000, 1. (cont'd.) p. 11a.
1000, 1. (cont'd.) p. 11a.
1000, 1. (cont'd.) p. 11a.

STRUNA, Albert, ing., prof.

Czechoslovak and Yugoslav water-wheel industry; some comparative
construction data. Stroj vest 6 no.1:21-25 Ja '60. (EEAI 10:5)

1. Clan urednistva, Strojniski vestnik, Ljubljana.
(Czechoslovakia--Water wheels)
(Yugoslavia--Water wheels)

STRUNA, Albert, prof., ing.

First symposium on the Slovenian technical terminology. Stroj
vest 6 no.6:187 D '60. (EEAI 10:6)

1. Urednistvo, Strojniski vestnik.
(Technology) (Slovenian language)

STRUNA, Albert, mech. eng., prof.

What is the matter with extraordinary studies. Stroj vest 7 no. 1
9-10 Ja '61. (EEAI 10:9)

1. Faculty for Mechanical Engineering, University of Ljubljana;
"Strojniski vestnik", clan urednistva.

(Mechanical engineering)

STRUNA, Albert, prof.inz.

"Corrosion of materials through pitting." Reviewed by A.Struna.
Stroj vest ? no.1/2:30 Ap '62.

1. Clan Urednistva, "Strojniski vestnik."

STRUNA, Albert, prof.inz.

"Hydraulic changer of rotatory moment and hydraulic coupling"
by R.Lusar. Reviewed by A.Struna. Stroj vestg no.1/2:30
Ap '62.

1. Clan Urednistva, "Strojniski vestnik."